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1. A multicast transmission method in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said multicast transmission method comprising the steps of:

a mobile station in said mobile stations sending a retransmission request signal to said base station when said mobile station detects an error in a received multicast signal; and

said base station judging whether a received signal indicates a retransmission request according to receiving quality of said received signal, and retransmitting a multicast signal corresponding to said retransmission request when said received signal indicates said retransmission request.

2. The multicast transmission method as claimed in claim 1, wherein said base station uses receiving power as said receiving quality, and judges that said received signal is said retransmission request from said mobile station when receiving power of said received signal is greater than a threshold.

3. The multicast transmission method as claimed in claim 1, wherein said mobile station sends spreading code as said retransmission request signal, and said base station obtains receiving quality of said spreading code, and said base station judges that said received signal is said retransmission request when said receiving quality is greater than a threshold.

4. The multicast transmission method as claimed in claim 3, wherein said base station performs pass diversity for receiving a signal from said mobile station.

5. A multicast transmission system in

which the same information is transmitted from a base station to a plurality of mobile stations, wherein:

a mobile station in said mobile stations sends a retransmission request signal to said base station when said mobile station detects an error in a received multicast signal; and

said base station judges whether a received signal indicates a retransmission request according to receiving quality of said received signal, and retransmits a multicast signal corresponding to said retransmission request when said received signal indicates said retransmission request.

6. The multicast transmission system as claimed in claim 5, wherein said base station uses receiving power as said receiving quality, and judges that said received signal is said retransmission request from said mobile station when receiving power of said received signal is greater than a threshold.

7. The multicast transmission system as claimed in claim 5, wherein said mobile station sends spreading code as said retransmission request signal, and said base station obtains receiving quality of said spreading code, and the base station judges that said received signal is said retransmission request when said receiving quality is greater than a threshold.

8. A mobile station in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said mobile station comprising:

means for sending a retransmission request signal to said base station when said mobile station detects an error in a received multicast signal.

9. The mobile station as claimed in claim

8. further comprising:

means for sending spreading code as said retransmission request signal.

10. A base station in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said base station comprising:

means for receiving a signal from said mobile station as a received signal;

means for judging whether said received signal indicates a retransmission request according to receiving quality of said received signal; and

means for retransmitting a multicast signal corresponding to said retransmission request when said received signal indicates said retransmission request.

11. The base station as claimed in claim 10, further comprising:

means for obtaining receiving power as said receiving quality;

means for judging that said received signal is said retransmission request from said mobile station when receiving power of said received signal is greater than a threshold.

12. The base station as claimed in claim 10, further comprising:

means for obtaining receiving quality of spreading code sent from said mobile station;

means for judging that said received signal is said retransmission request when said receiving quality is greater than a threshold.

13. The base station as claimed in claim 12, further comprising:

means for performing pass diversity for receiving a signal from said mobile station.

14. The multicast transmission method as claimed in one of claims 1-3, wherein:

when there are a plurality of received signals each having a receiving quality which is greater than a threshold, said base station preferentially retransmits a multicast signal corresponding to a received signal having the greatest receiving quality among said received signals.

15. The multicast transmission system as claimed in one of claims 8-7, wherein:

when there are a plurality of received signals each having a receiving quality which is greater than a threshold, said base station preferentially retransmits a multicast signal corresponding to a received signal having the greatest receiving quality among said received signals.

16. The base station as claimed in one of claims 10-12, further comprising:

means for preferentially retransmitting a multicast signal corresponding to a received signal having the greatest receiving quality when there are a plurality of received signals each having a receiving quality which is greater than a threshold.

17. A multicast transmission method in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said multicast transmission method comprising the steps of:

a mobile station sending a retransmission request signal to said base station when said mobile station detects an error in a multicast signal; and

said base station monitoring a receiving state of said multicast signal in said mobile stations, and changing a transmission method to conform to said receiving state according to a result of monitoring, and sending a multicast signal.

18. A multicast transmission method in a

multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said multicast transmission method comprising the steps of:

a mobile station sending a retransmission request signal to said base station when said mobile station detects an error in a multicast signal; and

said base station determining directivity of an antenna on the basis of an incoming wave from said mobile station, and retransmitting a multicast signal by using said directivity.

19. A multicast transmission method in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said multicast transmission method comprising the steps of:

a mobile station sending a retransmission request signal to said base station when said mobile station detects an error in a multicast signal; and

said base station retransmitting a multicast signal corresponding to said retransmission request signal after changing a transmission method when said base station receives said retransmission request signal from said mobile station.

20. (Amended) The multicast transmission method as claimed in one of claims 17 or 19, wherein said transmission method to be changed is an antenna directivity, a modulation method, a transmission speed, a spreading modulation method, error correction code, or a coded ratio.

21. A multicast transmission method in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said multicast transmission method comprising the steps of:

a mobile station measuring receiving

quality of a multicast signal, and judging whether said mobile station sends a retransmission request signal according to a result of said measuring; and

said base station retransmitting a multicast signal corresponding to said retransmission request signal when said base station receives said retransmission request signal from said mobile station.

22. The multicast transmission method as claimed in claim 21, wherein:

when said mobile station detects an error in said multicast signal, said mobile station sends said retransmission request signal when said receiving quality is better than a predetermined value, and said mobile station stores said retransmission request signal when said receiving quality is not better than a predetermined value; and

said mobile station sends said retransmission request signal which is stored when receiving quality becomes better than a predetermined value.

23. (Amended) The multicast transmission method as claimed in one of claims 21 or 22, wherein said receiving quality is receiving power of a received multicast signal, a ratio (CIR) between received multicast signal and interference power, an error rate of bit, packet or slot of a received multicast signal, or, a correction bit number or likelihood obtained when decoding error correction code.

24. (Amended) The multicast transmission method as claimed in one of claims [17-23] 17, 19, 21, or 22, wherein:

when said base station sends a retransmitting multicast signal or when said base station sends a new multicast signal after sending a retransmitting multicast signal, said base station sends said retransmitting multicast signal or said new multicast signal by using a specific channel which is occupied for communication between a mobile station which receives said retransmitting multicast signal or said new multicast signal and said base station.

25. (Amended) The multicast transmission method as claimed in one of claims [17-24] 17-19, 21, or 22, wherein:

if said mobile station receives a retransmitted multicast signal without an error after sending a retransmission request signal to said base station when detecting an error in a received multicast signal, said mobile station does not perform error detection for a multicast signal which includes the same information as said retransmitted multicast signal and which is further retransmitted after receiving said retransmitted multicast signal; and

when said mobile station does not detect any error in a received multicast signal, said mobile station does not send any signal.

26. A multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, wherein:

a mobile station sends a retransmission request signal to said base station when said mobile station detects an error in a multicast signal; and

said base station monitors a receiving state of said multicast signal in said mobile stations, and changes a transmission method to conform to said receiving state according to a result of monitoring, and sends a multicast signal.

27. A multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, wherein:

a mobile station sends a retransmission

request signal to said base station when said mobile station detects an error in a multicast signal; and

said base station determines directivity of an antenna on the basis of an incoming wave from said mobile station, and retransmits a multicast signal by using said directivity.

28. A multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, wherein:

a mobile station measures receiving quality of a multicast signal, and judges whether said mobile station sends a retransmission request signal according to a result of measuring; and

said base station retransmits a multicast signal corresponding to said retransmission request signal when said base station receives said retransmission request signal from said mobile station.

29. A mobile station in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said mobile station comprising:

means for measuring receiving quality;

means for sending a retransmission request signal if said receiving quality is better than a predetermined value when said mobile station detects an error in a multicast signal;

means for storing said retransmission request signal when said receiving quality is not better than a predetermined value, and sending said retransmission request signal which is stored when receiving quality becomes better than a predetermined value.

30. The mobile station as claimed in claim 29, wherein said receiving quality is receiving power of a received multicast signal, a ratio (CIR)

between received multicast signal and interference power, an error rate of bit, packet or slot of a received multicast signal, or, a correction bit number or likelihood obtained when decoding error correction code.

31. A mobile station in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said mobile station comprising:

means for controlling said mobile station such that if said mobile station receives a retransmitted multicast signal without an error after sending a retransmission request signal to said base station when detecting an error in a received multicast signal, said mobile station does not perform error detection for a multicast signal which includes the same information as said retransmitted multicast signal and which is further retransmitted after receiving said retransmitted multicast signal, and when said mobile station does not detect any error in a received multicast signal, said mobile station does not send any signal.

32. A base station in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said base station comprising:

means for monitoring a receiving state of a multicast signal in said mobile stations; and

means for changing a transmission method to conform to said receiving state according to a result of monitoring, and sending a multicast signal.

33. A base station in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said base station comprising:

means for determining directivity of an antenna on the basis of an incoming wave from said

mobile station, and retransmitting a multicast signal by using said directivity.

34. A base station in a multicast transmission system in which the same information is transmitted from a base station to a plurality of mobile stations, said base station comprising:

means for changing a transmission method when said base station receives a retransmission request signal from said mobile station and retransmitting a multicast signal corresponding to said retransmission request signal.

35. (Amended) The base station as claimed in one of claims 32 or 34, wherein said transmission method to be changed is an antenna directivity, a modulation method, a transmission speed, a spreading modulation method, error correction code, or a coded ratio.

36. (Amended) The base station as claimed in one of claims [32-35] 32-34, wherein:

when said base station sends a retransmitting multicast signal or when said base station sends a new multicast signal after sending a retransmitting multicast signal, said base station sends said retransmitting multicast signal or said new multicast signal by using a specific channel which is occupied for communication between a mobile station which receives said retransmitting multicast signal or said new multicast signal and said base station.--